## WORLD INTELLECTUAL PROPERTY ORGANIZATION International Bureau



## INTERNATIONAL APPLICATION PUBLISHED UNDER THE PATENT COOPERATION TREATY (PCT)

(51) International Patent Classification 7:

(11) International Publication Number:

WO 00/57300

G06F 17/30

A1

(43) International Publication Date: 28 September 2000 (28.09.00)

(21) International Application Number:

PCT/IL00/00178

(22) International Filing Date:

20 March 2000 (20.03:00)

(30) Priority Data:

09/273,464

22 March 1999 (22.03.99)

US

(71) Applicant (for all designated States except US): INTERLINK COMPUTER COMMUNICATIONS LTD. [IL/IL]; Jabotinsky Street 5, Ramat-Gan 52520 (IL).

(72) Inventor; and

(75) Inventor/Applicant (for US only): HADAS, Ilan [IL/IL]; Hahadarim 127, Tzoran 42823 (IL).

(74) Agent: PLINNER SA'AR, ADV.; Dizengoff Street 10, Tel Aviv 64281 (IL).

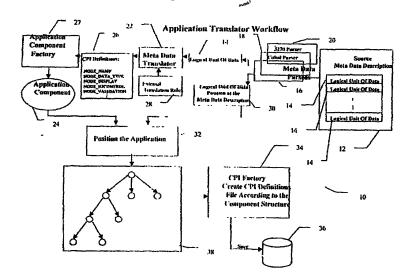
(81) Designated States: AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, CA, CH, CN, CR, CU, CZ, DE, DK, DM, DZ, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, NO, NZ, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TR, TT, TZ, UA, UG, US, UZ, VN, YU, ZA, ZW, ARIPO patent (GH, GM, KE, LS, MW, SD, SL, SZ, TZ, UG, ZW), Eurasian patent (AM, AZ, BY, KG, KZ, MD, RU, TJ, TM), European patent (AT, BE, CH, CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE), OAPI patent (BF, BJ, CF, CG, CI, CM, GA, GN, GW, ML, MR, NE, SN, TD, TG).

Published

Ą.

With international search report.

(54) Title: AUTOMATIC INTERFACE GENERATION FOR AN ENTERPRISE RESOURCE



## (57) Abstract

A system and method are presented for automatically accessing stored data via an enterprise data resource, without actually altering the stored data. Rather, the present invention creates an interface (46) that enables the user to write and retrieve data via the enterprise resource. First, the enterprise resource is analyzed and decomposed into logical data units (14). Next, each logical data unit (14) is translated into an application component (24), comprising an object associated with methods and data. Next, each application component (24) is added to a hierarchical object-oriented data structure (38) according to the relationships between logical data units (14). The data structure (38) may be manually edited by the user. Finally, the data structure is translated into an application by an engine using a "factory" model, thereby efficiently coding the portions of the interface that are similar or identical for all enterprise data resources. The final application is preferably a group of objects having a user interface, data input, and data output.